Commentary

Developmental trajectory of substance use disorders: What role do the parents play (or are perceived to play)?

The aetiology of substance use disorders is considered to be multi-factorial as the individual, developmental and contextual dimensions interact together. From the developmental perspective, research has identified several aspects of family environment that are consistently associated with substance use disorders. Parent child interaction and parenting style are the primary focus of research. A conflict ridden and highly authoritarian parent child interaction predicts substance use in the future¹. On the other hand, parenting style can both be a risk or a protective factor depending on its characteristics. Parental warmth as well as limit setting could be protective for future substance use².

Parenting style is not a unitary concept. It is largely dependent on direct factors like parental personality, psychopathology, and substance use and on the indirect effects of other contextual factors like low socioeconomic status (LSES), minority status, immediate environmental adversities and children's maladaptive behaviour³. Parental substance use has been consistently linked to substance use in the offspring^{4,5}. Addicted mother's parenting has been characterized by a wide range of deficits starting from neglect, physical or emotional abuse, punishments to excessive control. lack of emotional involvement and inconsistent discipline². In addition, parental psychopathology like depression, anxiety or antisocial personality and poor coping with stress has been demonstrated to be related with substance use disorders in their children^{4.6}. But this indictment of the parents needs to be seen in the light of the various contextual factors². This proposition could be more appealing in the traditional societies where there is interdependence and family is the most important institution that has survived through the ages. These traditional societies are collectivist (with a sense of harmony, interdependence and concern for others, and where collective values of the family take precedence over individual values in case of a conflict) that emphasizes family integrity, family loyalty, and family unity⁷.

In the article by Pettenon & colleagues published in this issue⁸, the perception of parental bonding has been compared between crack cocaine users and nonillicit drug users. The authors examined hospitalized cocaine dependent subjects and non-illicit drug users as control subjects, both from the same geographical area with matched demographic characteristics. Parental bonding instrument (PBI)9 was used to assess various parenting style in both the parents. PBI measures two constructs: care and control. With various permutation and combinations of these constructs, four different styles of parenting are possible: optimal parenting (high care, low control), affectionate control (high care, high control), affectionless control (low care, high control) and neglectful parenting (low care, low control)9. Results of this study demonstrated that crack cocaine users were more likely to perceive their mothers as neglectful and their fathers as carelessly controlling. On the other hand, non-illicit drug users were perceived to have optimal parenting. This study has highlighted the importance of parenting style in the developmental trajectory both as risk factors (for cocaine users) and perhaps as protective factors (for the control subjects) for development of later substance dependence.

The study was cross-sectional and conducted on an exclusively male clinical sample selected by non-random purposive method. As already acknowledged by the authors, these factors have curbed the generalizability of the study and its strength to establish causality⁸. But, by choosing clinical population the authors perhaps were able to tap the most severe end of the spectrum of substance use disorder which could be assumed to be homogeneous. They had a reasonably large sample size seemingly adequate for the purpose

of the study. To eliminate the effects of the contextual factors like LSES, ethnic minority or adverse residential environment, the study subjects and the controls were matched as per their socio-demography. Hence, the result of 'disordered' parental bonding in the cocaine dependent subjects was unlikely to be due to other contextual variables. Additionally, exclusion of these contextual factors has made the association of impaired parental bonding with substance dependence more specific. Nevertheless, there are a few caveats in the study. As the authors have only studied subjects with substance use disorder, there is always a possibility of subjective bias coloured by subjects' personality and personal experience. Concurrent interview of the parents could have eliminated this possibility. The subjects with cocaine dependence had significantly higher psychiatric co-morbidity than the controls. As it has been amply researched that psychiatric disorders like depression and anxiety are linked to childhood adversities and impaired parenting, presence of these co-morbidities perhaps confounded the association of parenting style and cocaine dependence^{10,11}. However, epidemiological studies have shown that almost half of those having substance use disorders have a mental illness in their lifetime. The risk of developing a mental illness is 2-4 times more common in subjects with substance dependence than the controls^{12,13}. Hence, it would practically be impossible to find out a substance use disorder group which does not differ significantly from controls with regard to the presence of psychiatric co-morbidity.

As a final note, there is a philosophical controversy in any research directed to the area of parenting style and future psychopathology. The controversy pivots around causality. One is reminded of Freida Fromm-Reichmann's theory of 'schizophrenogenic mother', which stated that schizophrenia is 'caused' due to unconscious rejection by the mother of the child (who later grows up to develop schizophrenia)¹⁴. A commentator has recently observed on its current status: "Today, in light of what we now understand about schizophrenia, the theory of the schizophrenogenic mother seems hopelessly mistaken, and more than a little embarrassing"15. Likewise, one has to be careful in the interpretation of this study findings, lest 'affectionless', 'controlling' and 'neglecting' parents are easily labelled as 'addictogenic'. This could have the appalling potential to inflict pain and burden to the parents who were and would be the primary caregiver for their kids. 'Blaming' the parenting style and family interaction for addiction in other family members

could, therefore, be a double edged sword and might well be detrimental.

It is, therefore, important to remember that the parenting styles reported in this study⁸ are 'perceived' parenting styles rather than actually observed parenting styles. Such perceptions can be distorted through the looking glass of chronic addiction. It is extremely difficult to conduct prospective longitudinal cohort studies to settle this issue. In an exceptional 30-year prospective study published very recently, unsupportive maternal behaviour, actually observed and rated by a developmental psychologist at eight months of age of the infant, predicted mental health problems in the grown up adults 30 years later¹⁶. Such studies are rare to come by. 'Perceived' parenting styles in a retrospective recall design cannot, and should not, implicate causality of addiction as 'addictogenic' parents. The value of the current study⁸, therefore, does not lie in inference of causality of any sort, but in the very fact that these 'perceived' parenting styles can have important bearing on the course and outcome of the subjects' substance use trajectory. These need to be considered in the therapy of these subjects.

The present study by Pettenon & colleagues⁸ is from Brazil, which is one of the BRIC (Brazil, Russia, India, and China) countries which are developing or newly industrialised countries, distinguished by their large, fast-growing economies. All these countries have their commonalities in the primacy of family or collectivistic society over the individualistic society. Hence, the results of this study could be equally relevant and meaningful for Indian context.

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